Author index

Abdel-Massih, R.M. 423
Abel, S. 13
Ackers, D. 133
Aizawa, S. 493
Akagi, H. 265
Akita, S. 467
Andeme-Onzighi, C. 256
Andralojc, P.J. 112
Arango, M. 609
Arnould, C. 609
Asami, T. 781
Assmann, S.M. 209
Astot, C. 715
Astoul, C.H. 546

Babakov, A.V. 446
Bakker, A. 13
Balbo, I. 841
Balint-Kurti, P.J. 546
Barre, A. 546, 791
Batchelor, A.K. 484
Baumert, A. 883
Baydoun, E.A.-H. 423
Bayliss, P. 182
Beck, C.F. 287
Becker, T.W. 587, 800
Beeckman, H. 502
Beeckman, T. 623, 632
Béguiristain, T. 722
Behringer, F.J. 34
Bekman, E.P. 663
Benemann, J.R. 335
Berna, A. 345
Bernier, F. 345
Bernier, G. 370
Beyer, P. 846
Biela, A. 85
Bilger, W. 770
Bischof, K. 555
Bitonti, M.B. 127
Blervacq, A.-S. 305
Bligny, R. 770
Boerjan, W. 502
Bohmert, K. 841
Bonetta, D. 182
Bongcam, V. 150
Bork, C. 587
Boutilier, K. 484
Bowman, L. 484
Bramley, P.M. 361
Brändle, K. 575
Bravo, J.M. 62
Bray, E.A. 173
Brett, C.T. 423
Brugière, N. 510, 519
Brunold, C. 528
Buchen, B. 133
Burhenne, N. 440
Burssens, S. 623, 632

Caba, J.M. 98
Callow, J.A. 641
Campos, M.E. 23
Cantisán, S. 673
Carrayol, E. 800
Cassab, G.I. 23
Catesson, A.-M. 563
Centeno, M.L. 98
Cessna, S.G. 736
Chandra, S. 736
Chapman, A. 305
Charpentier, J.-P. 563
Chelysheva, V.V. 446
Chen, D.L. 13
Chen, Y.-F. 752
Chevalier, C. 430
Chia, D.W. 743
Chiatante, D. 173
Chuong, S.D.X. 227
Colman, B. 43
Coraggio, I. 144
Côté, F. 596
Couée, I. 563
Crawford, S.A. 641
Creissen, G.P. 537
Crowley, D.E. 120
Crozier, A. 715
Curatti, L. 729

Davies, H.V. 708
de Almeida Engler, J. 623
De Boer, A.H. 446
De Jong, A.J. 656
De Rycke, R. 502
Delatorre, C.A. 13
Deltour, R. 370
Devine, R. 736
Di Cataldo, A. 663
Dietz, K.-J. 390
Ditengou, F.A. 722
Dolan, L. 191
Driouich, A. 256
Driscoll, S.P. 112
Driss-Ecole, D. 396
Dubois, F. 519

Echeverría, E. 77
Edlund, A. 715
Emerich, D.W. 218
Engler, G. 502
Ermel, F.F. 563
Espie, G.S. 43

Fabian, T. 376
Farrant, J.M. 693
Feldman, L.J. 23
Fernández, B. 98
Fernández, E. 287
Ferreira, P. 623
Flores, S. 823
Forreiter, C. 575
Franceschi, V.R. 227
Francis, D. 127
Franken, P. 85
Fraser, P.D. 361
Fry, S.C. 275, 679
Fujii, N. 493
Fujino, K. 756
Fukuda, H. 457

Galiba, G. 528
Galli, U. 528
Galván, A. 287
Garcés, R. 673
Gianinazzi, S. 609
Gianinazzi-Pearson, V. 85, 609
Gibson, S.I. 743
Gierth, M. 816
Gijzen, M. 484
Gilroy, S. 209
Girault, R. 256
Gonzalez, P.C. 77
Graser, G. 239
Gray, D.J. 200
Gray, J.C. 112
Gressel, J. 50
Gresshoff, P.M. 98
Griffiths, A. 173
Grotewold, E. 887
Gubatz, S. 325
Guttenberger, M. 299

Hahn, M.G. 596
Han, Y.-Z. 158
Hanelt, D. 555
Haritatos, E. 105
Hartmann, T. 239
Hartung, W. 874
Havelange, A. 370
Heber, U. 246, 770
Hedrich, R. 246
Hejnowicz, Z. 133
Hell, R. 587
Herrera, A.F. 791
Herrera-Estrella, L. 729
Higgins, M.J. 641
Hilbert, J.-L. 305
Hiltunen, J.K. 150
Himanen, K. 632
Hiradate, S. 355
Hirel, B. 510, 519, 800
His, I. 256
Hocart, C.H. 406
Hoeberichts, F.A. 656
Holzamer, S. 816
Honda, H. 265
Hose, E. 874
Hu, M. 484
Huang, B.-Q. 158
Huang, J. 467
Huertas, I.E. 43
Hugueney, P. 846

Innocenti, A.M. 127
Inzé, D. 623, 632

Jacob, T. 209
Janzik, I. 91
Jay-Allemand, C. 563
Jayasankar, S. 200
Jeune, B. 396
Johnson, D.A. 484
Johnston, M.L. 72
Jones, C.S. 708
Joubès, J. 430
Julianus, P. 396

Kaldenhoff, R. 85, 167
Kamada, M. 493
Kamasawa, N. 265
Kamigaichi, S. 493
Karr, D.B. 218
Kidner, C. 191
Kikuta, Y. 756
Kiss, J.Z. 415
Kleinig, H. 846
Klychnikov, O.I. 446
Knight, J.S. 112
Kocsy, G. 528
Koda, Y. 756
Kopka, J. 841
Kraft, T.F.B. 415
Krajinski, F. 85
Kruger, N.J. 864
Kunz, U. 816

Labbé, H. 484
Lange, A.J. 864
Lange, O.L. 770
Lapeyrie, F. 722
Laudert, D. 163
Lawlor, D.W. 112
Leech, R.M. 150
Lehmann, H. 816
Leubner-Metzger, G. 144
Li, Z. 200
Liang, R.-T. 218
Ligero, F. 98
Llorente, F. 648
Lohaus, G. 833
López-Juez, E. 807
Lorbiecke, R. 376
Löw, D. 575
Low, P.S. 736
Lubian, L.M. 43
Luján, R. 23
Lüttge, U. 761

Ma, J.F. 355
Macías, M.I. 287
MacDonald-Comber Petétot, J. 150
Mancuso, S. 384
Mandoli, D.F. 474
Marras, A.M. 384
Marshall Porterfield, D. 474
Martínez-Force, E. 673
Martínez-Zapater, J.M. 648
Martinoia, E. 390
Marubashi, W. 614
Masclaux, C. 510, 519
Massonneau, A. 390
Masuda, K. 756
Matsubayashi, Y. 752
Maximova, E. 656

Author index

Abdel-Massih, R.M. 423
Abel, S. 13
Ackers, D. 133
Aizawa, S. 493
Akagi, H. 265
Akita, S. 467
Andeme-Onzighi, C. 256
Andralojc, P.J. 112
Arango, M. 609
Arnould, C. 609
Asami, T. 781
Assmann, S.M. 209
Astot, C. 715
Astoul, C.H. 546

Babakov, A.V. 446
Bakker, A. 13
Balbo, I. 841
Balint-Kurti, P.J. 546
Barre, A. 546, 791
Batchelor, A.K. 484
Baumert, A. 883
Baydoun, E.A.-H. 423
Bayliss, P. 182
Beck, C.F. 287
Becker, T.W. 587, 800
Beeckman, H. 502
Beeckman, T. 623, 632
Béguiristain, T. 722
Behringer, F.J. 34
Bekman, E.P. 663
Benemann, J.R. 335
Berna, A. 345
Bernier, F. 345
Bernier, G. 370
Beyer, P. 846
Biela, A. 85
Bilger, W. 770
Bischof, K. 555
Bitonti, M.B. 127
Blervacq, A.-S. 305
Bligny, R. 770
Boerjan, W. 502
Bohmert, K. 841
Bonetta, D. 182
Bongcam, V. 150
Bork, C. 587
Boutilier, K. 484
Bowman, L. 484
Bramley, P.M. 361
Brändle, K. 575
Bravo, J.M. 62
Bray, E.A. 173
Brett, C.T. 423
Brugière, N. 510, 519
Brunold, C. 528
Buchen, B. 133
Burhenne, N. 440
Burssens, S. 623, 632

Caba, J.M. 98
Callow, J.A. 641
Campos, M.E. 23
Cantisán, S. 673
Carrayol, E. 800
Cassab, G.I. 23
Catesson, A.-M. 563
Centeno, M.L. 98
Cessna, S.G. 736
Chandra, S. 736
Chapman, A. 305
Charpentier, J.-P. 563
Chelysheva, V.V. 446
Chen, D.L. 13
Chen, Y.-F. 752
Chevalier, C. 430
Chia, D.W. 743
Chiatante, D. 173
Chuong, S.D.X. 227
Colman, B. 43
Coraggio, I. 144
Côté, F. 596
Couée, I. 563
Crawford, S.A. 641
Creissen, G.P. 537
Crowley, D.E. 120
Crozier, A. 715
Curatti, L. 729

Davies, H.V. 708
de Almeida Engler, J. 623
De Boer, A.H. 446
De Jong, A.J. 656
De Rycke, R. 502
Delatorre, C.A. 13
Deltour, R. 370
Devine, R. 736
Di Cataldo, A. 663
Dietz, K.-J. 390
Ditengou, F.A. 722
Dolan, L. 191
Driouich, A. 256
Driscoll, S.P. 112
Driss-Ecole, D. 396
Dubois, F. 519

Echeverría, E. 77
Edlund, A. 715
Emerich, D.W. 218
Engler, G. 502
Ermel, F.F. 563
Espie, G.S. 43

Fabian, T. 376
Farrant, J.M. 693
Feldman, L.J. 23
Fernández, B. 98
Fernández, E. 287
Ferreira, P. 623
Flores, S. 823
Forreiter, C. 575
Franceschi, V.R. 227
Francis, D. 127
Franken, P. 85
Fraser, P.D. 361
Fry, S.C. 275, 679
Fujii, N. 493
Fujino, K. 756
Fukuda, H. 457

Galiba, G. 528
Galli, U. 528
Galván, A. 287
Garcés, R. 673
Gianinazzi, S. 609
Gianinazzi-Pearson, V. 85, 609
Gibson, S.I. 743
Gierth, M. 816
Gijzen, M. 484
Gilroy, S. 209
Girault, R. 256
Gonzalez, P.C. 77
Graser, G. 239
Gray, D.J. 200
Gray, J.C. 112
Gressel, J. 50
Gresshoff, P.M. 98
Griffiths, A. 173
Grotewold, E. 887
Gubatz, S. 325
Guttenberger, M. 299

Hahn, M.G. 596
Han, Y.-Z. 158
Hanelt, D. 555
Haritatos, E. 105
Hartmann, T. 239
Hartung, W. 874
Havelange, A. 370
Heber, U. 246, 770
Hedrich, R. 246
Hejnowicz, Z. 133
Hell, R. 587
Herrera, A.F. 791
Herrera-Estrella, L. 729
Higgins, M.J. 641
Hilbert, J.-L. 305
Hiltunen, J.K. 150
Himanen, K. 632
Hiradate, S. 355
Hirel, B. 510, 519, 800
His, I. 256
Hocart, C.H. 406
Hoeberichts, F.A. 656
Holzamer, S. 816
Honda, H. 265
Hose, E. 874
Hu, M. 484
Huang, B.-Q. 158
Huang, J. 467
Huertas, I.E. 43
Hugueney, P. 846

Innocenti, A.M. 127
Inzé, D. 623, 632

Jacob, T. 209
Janzik, I. 91
Jay-Allemand, C. 563
Jayasankar, S. 200
Jeune, B. 396
Johnson, D.A. 484
Johnston, M.L. 72
Jones, C.S. 708
Joubès, J. 430
Julianus, P. 396

Kaldenhoff, R. 85, 167
Kamada, M. 493
Kamasawa, N. 265
Kamigaichi, S. 493
Karr, D.B. 218
Kidner, C. 191
Kikuta, Y. 756
Kiss, J.Z. 415
Kleinig, H. 846
Klychnikov, O.I. 446
Knight, J.S. 112
Kocsy, G. 528
Koda, Y. 756
Kopka, J. 841
Kraft, T.F.B. 415
Krajinski, F. 85
Kruger, N.J. 864
Kunz, U. 816

Labbé, H. 484
Lange, A.J. 864
Lange, O.L. 770
Lapeyrie, F. 722
Laudert, D. 163
Lawlor, D.W. 112
Leech, R.M. 150
Lehmann, H. 816
Leubner-Metzger, G. 144
Li, Z. 200
Liang, R.-T. 218
Ligero, F. 98
Llorente, F. 648
Lohaus, G. 833
López-Juez, E. 807
Lorbiecke, R. 376
Löw, D. 575
Low, P.S. 736
Lubian, L.M. 43
Luján, R. 23
Lüttge, U. 761

Ma, J.F. 355
Macías, M.I. 287
MacDonald-Comber Petétot, J. 150
Mancuso, S. 384
Mandoli, D.F. 474
Marras, A.M. 384
Marshall Porterfield, D. 474
Martínez-Force, E. 673
Martínez-Zapater, J.M. 648
Martinoia, E. 390
Marubashi, W. 614
Masclaux, C. 510, 519
Massonneau, A. 390
Masuda, K. 756
Matsubayashi, Y. 752
Maximova, E. 656

May, G.D. 546, 791
Mazzuca, S. 127
McCourt, P. 182
McQueen-Mason, S.J. 583
Medford, J.I. 34
Medville, R. 105
Melis, A. 335
Membré, N. 345
Menu-Bouaouiche, L. 791
Merchán, F. 287
Micol, J.L. 606
Miernyk, J.A. 72
Migge, A. 587
Miki, B.L.A. 484
Milkowski, C. 883
Mimura, T. 390
Min, Y.K. 781
Mittendorf, V. 150, 841
Moellers, C. 833
Morot-Gaudry, J.-F. 510
Morvan, C. 256
Muench, D.G. 227
Mukai, C. 493
Müller, A. 855
Mullineaux, P.M. 537
Müntz, K. 1
Mulvaney, P. 641
Mundree, S.G. 693
Murphy, A. 315

Nagata, N. 781
Nakano, T. 781
Nawrath, C. 841
Neimanis, S. 246
Neubohn, B. 1, 325
Nieto-Sotelo, J. 23
Nishiwaki, M. 756
Niwa, M. 614
Nover, L. 575

Okita, T.W. 227
Oliveros, J.C. 648
Ormenese, S. 370
Osumi, M. 265
Otto, B. 167
Oufattole, M. 609

Papeschi, G. 384
Parker, D.R. 120
Parsons, R.L. 34
Paterson, A.E.J. 679
Patrick, J.W. 894
Paul, M.J. 112
Pedler, J.F. 120
Peer, W.A. 315
Peng, L. 406
Perbal, G. 396
Pérez-Pérez, J.M. 606
Petruzzelli, L. 144
Peumans, W.J. 546, 791
Piqueras, P. 606
Poirier, Y. 150, 841
Polle, J.E.W. 335
Ponce, G. 23
Ponce, M.R. 606
Porchia, A.C. 729
Pozuelo, M. 287
Prouteau, M. 396

Qin, Y.-M. 150

Rabinowicz, P.D. 887
Randall, D.D. 72
Raymond, P. 430
Redmond, J.W. 406
Regalado, A.P. 663
Reiter, W.-D. 743
Reuhs, B.L. 218
Reyes, A. 23
Ricardo, C.P. 663
Richard, C. 623
Rizk, S.E. 423
Roberts, K. 191
Roberts, K.A. 596
Robertson, E.J. 150
Rochange, S.F. 583
Rodrigues-Pousada, C. 663
Romano, L.A. 209
Rougé, P. 546, 791
Rovira, P. 546
Rüegsegger, A. 528
Rufat, M. 62

Sage, T. 182
Saibo, N.J.M. 663
Sakagami, Y. 752
Salerno, G.L. 729
Salinas, J. 648
San Segundo, B. 62
Sandberg, G. 715
Sangwan, R.S. 519
Sato-Nara, K. 457
Sauter, M. 376
Savchenko, G. 246
Schaller, A. 91
Schaller, F. 163
Schleiff, E. 449
Schubert, D. 85
Schuch, W. 361
Scippa, G.S. 173
Scott, P. 864
Serikawa, K.A. 474
Serrano-Vega, M.J. 673
Shaul, O. 623
Shea Miller, S. 484
Shimazu, T. 493
Sievers, A. 133
Sitbon, F. 715
Smart, C.C. 823
Smith, P.J.S. 474
Soll, J. 449
Staiger, D. 345
Stelzer, R. 816
Steudle, E. 874
Stevens, R.G. 537
Strack, D. 883
Sun, S. 182
Sundaresan, V. 191
Suter, M. 528
Szalai, G. 528

Taiz, L. 315
Takahashi, H. 493
Takano, T. 467
Takeuchi, Y. 265
Tamayo, M.C. 62
Tanaka, A. 335
Taylor, M.A. 708
Thompson, J.E. 275
Thomson, J.A. 693
Thorogood, K. 807
Tiedemann, J. 1
Tillberg, J.-E. 701
Tischendorf, G. 841
Tischner, R. 440
Trethewey, R.N. 841
Trofimova, M.S. 446
Truffa-Bachi, P. 546
Turgeon, R. 105
Tyerman, S.D. 894

Umeda, M. 376

Valadier, M.-H. 510
van de Cotte, B. 632
Van Damme, E.J.M. 546, 791
Van den Ende, W. 701
Van Leuven, F. 546, 791
Van Loon, J.J.W.A. 415
Van Montagu, M. 502, 623, 632
Vander Mijnsbrugge, K. 502
Vasseur, J. 305
Verbruggen, N. 632
Vetsch, M. 91
Vinti, G. 807
Vizoso, S. 563
von Ballmoos, P. 528
von Lintig, J. 846

Walker, N.A. 894
Walsh, D. 430
Wang, C. 701
Weber, H. 325
Weiler, E.W. 163, 855
Welsch, R. 846
Weston, E. 807
Wetherbee, R. 641
Whittaker, A. 693
Wiencke, C. 555
Wiese, C. 246
Williamson, R.E. 406
Willis, S.C. 679
Willmitzer, L. 841
Wobus, U. 325
Woltering, E.J. 656

Yahraus, T. 736
Yakimova, E.T. 656
Yamada, T. 614
Ye, B. 50
Yoder, T.J. 743
Yoshida, S. 781
Yuan, M. 158

Zee, S.-Y. 158
Zhang, W. 546
Zhang, W.-H. 894
Zorinyanz, S.E. 446

Subject index

Abscisic acid 98, 209, 528, 648, 756, 823, 874
Acetabularia (subcellular differentiation) 474
Acidification 770
Actin cytoskeleton 396
Acyl-acyl carrier protein thioesterase 673
Acyl-CoA oxidase 150
Adventitious root formation 563
Aldose reductase 693
Allium 299
Aluminium form 355
Amino acid 587, 833
1-Aminocyclopropane-1-carboxylate synthase 663
1-Aminocyclopropane-1-carboxylic acid oxidase 144
Aminopeptidase 315
Amyloplast 415
Anabaena sp. (sucrose metabolism) 729
Anthracnose 200
Antioxidant enzymes 50
Apical meristem 457
Apoplast 246
Apoptosis 614, 656
Aquaporin 85, 874
Aquaporin (NtAQP1 immunolocalization) 167
Arabidopsis 13, 150, 191, 345, 415, 606, 807
Arabidopsis (auxin transport) 315
Arabidopsis (brassinosteroid, mutant) 781
Arabidopsis (cell cycle) 623, 632
Arabidopsis (cellulose, mutants) 406
Arabidopsis (farnesylation, mutant) 182
Arabidopsis (fumaric acid) 743
Arabidopsis (mutant *frs1*) 648
Arabidopsis (PHB production) 841
Arabidopsis (*shz-2* mutant) 34
Arabidopsis (sucrose transport) 105
Arabidopsis (tryptophan mutant) 855
Arabinogalactan-protein 256, 305
Arabinoxylan 679
Arbuscular mycorrhiza 85, 609
Arbuscule 299
Atomic force microscopy 641
ATPase 77
Auxin 98, 493, 315
Auxin biosynthesis 855

Baculovirus/insect cell expression 91
Beta vulgaris 77
Beta (H^+-ATPase) 446
Bicarbonate transport 43
Binding (pectin) 423
Binding site (glucan) 596
Bioadhesion 641
Biofouling 641
Bradyrhizobium 218
Brassica 833, 883
Brassica (germination) 1
Brassicaceae 883
Brassinazole 781
Brassinosteroid biosynthesis 781
Buffer capacity 246
Buthionine sulfoximine 528

C_4 photosynthesis 265
C_4-plant 800
Calcification 474
Calvin cycle 112
Carbon partitioning 864
Carbohydrate fractionation 406
Carbohydrate state 325
Carbonic anhydrase 43
Carotenoid 361
Casparian band 816
Caspase 656
Catharanthus 390
Cell cycle 127, 623
Cell death 614, 656
Cell division 376, 430
Cell expansion 430
Cell extension 467
Cell type specificity 800
Cell wall 345, 406, 583, 679
Cellular differentiation 325
Cellulose synthesis 406
Chalcone synthase 563
Chaperone activity 575
Chara 133
Chlamydomonas 287
Chlamydomonas (mutant) 335
Chlorella 440
Chlorophyll *a*/*b* ratio 265
Chlorophyll *b*-less mutant 335
Chlorophyll fluorescence 770
Chloroplast 72, 246, 361, 449, 807, 846
Chromate 390
Chromatin 173
Cichorium (somatic embryogenesis) 305
Circadian rhythm 761
Clonal analysis 191
CO_2 efflux 43
Cold acclimation 648
Conditional genetic screen 13
Conyza (oxidative stress) 50
Cortical cytoskeleton 227
Cotyledon 563
Crassulacean acid metabolism 761
Cross-links 679
Cryptochrome 807
CS-IAA1 493
Cucumis (expansin) 583
Cucumis (gravimorphogenesis) 493
Current activation (fast, time dependent) 894
Cyanobacterium 729
Cyclic electron flow 770
Cyclin 376, 430, 623
Cyclin-dependent kinases 632
Cyclin-dependent protein kinase 376
Cysteine 528
Cytokinin 98
Cytoplasmic streaming 133
Cytosol 246
Cytosol (GS, leaf) 519
Cytosolic calcium 209

Daucus (embryogenesis, stress) 756
Daucus (somatic embryogenesis) 457
Dehydration 648, 770
Desensitization (oxidative burst) 736
Desiccation stress 693
Development (root cap) 23
Diferulate 679
Differential gene expression 606, 663
Differentiation 34
4,4-Diisothio cyanostilbene-2,2′-disulfonic acid 390
Disease resistance (grapevine) 200
DNA insertions (identification) 887
DNA replication 127
DNA synthesis 457

Ectomycorrhiza (signal) 722
Elicitor 596
Embryogenesis 623
Endodermis 816
Endoplasmic reticulum subdomain 227
Endoreduplication 430
Endosperm 227
Enteromorpha 641
Envelope 449
Environmental stress 467
Enzyme characterisation (leaf GR) 537
Epidermal cells 756
Ethylene 144, 663
Eustigmatophyceae 43
Exodermis 816
Exopolysaccharide 218
Expansin 583
α-Expansion 467
Extracellular matrix 345

Fagopyrum (Al uptake) 355
Farnesylation 182
Feedback regulation 144
Female germ unit 158
Fertilization 158
Ferulate 679
Flavonoid 315
Floral transition 370
Freezing tolerance 648
frs1 mutant 648
Fructan 701
Fructose 2,6-bisphosphate 864
Fructose-2,6-bisphosphatase 864
Fruit (protein) 791
Fruit development 430
Fruit lectins 546
Fruit ripening 708
Fumaric acid 743

Gametogenesis 287
Gene expression (cyclin) 623
Gene expression (fruit) 708
Gene induction (*pma*) 609
Germin 345
Germination 1
Germin-like protein 345
Gibberellin 376
Globulin breakdown 1
Glomus 85, 299
Glucosyltransferase 883
β-D-Glucosyl Yariv reagent 305
β-Glucuronidase 632
Glucuronoarabinoxylan 423
Glutamate dehydrogenase 510, 800
Glutamine synthetase 510, 519, 587, 801
Glutathione 528
Glutathione reductase 528, 537
Glycine max (oxidative burst) 736
Glycine (nodulation) 218
Glycine (seed coat) 484
Glycine (soybean) 98
Glycine-rich protein 256
Glycoprotein 423
Glycoprotein (adhesive) 641
Glyoxysome 150
Grana development 265
Gravimorphogenesis 493
Gravity effect 133
Growth 376
Growth (expansin) 583

Guard cell 209
Guidance complex 449

H^+-ATPase 446, 609
H1 histone 173
(HCO_3^- uptake) 43
Heat stress 575
Helianthus (seed formation) 673
Hepta-β-glucoside 596
Homogalacturonan 275
Hordeum (Zn, Fe deficiency) 120
Hordeum (N-deficiency) 701
Hordeum (La^{3+} transport) 816
Hybrid lethality 614
Hydraulic conductivity 874
Hydroxycinnamates 883
Hydroxyproline-deficient protein 256
Hypaphorine 722

Indole-3-acetic acid 663, 722
Indole-3-acetic acid (turnover, metabolism) 715
Indole-3-glycerophosphate 855
Induction (antioxidant enzymes, mRNA) 50
Inhibitor (DIDS) 43
Initials 191
Inositol 823
Inositol trisphosphate synthase 823
Instantaneous current 894
Interspecific hybrid 614
Invasions 191
Invertase 325
Iron deficiency 120

Jacalin 546
Juglans (root formation) 563

K^+ channels 209

Lactuca (cell cycle) 127
Lanthanum (localization, translocation) 816
Laser-Doppler-velocimetry 133
Leaf development 807
Leaf senescence 510
Lectin 546
Lectin binding (soybean) 218
Lens (statolith movement) 396
Leucine-rich protein 256
Light 112
Light-harvesting complex 335
Lignan 502
Lignification 502
Linum (cell wall) 256
Lipid biosynthesis 673
Lipid modification 182
Lupinus (ethylene) 663
Lycopersicon 575, 656
Lycopersicon (carotenoids) 361
Lycopersicon (fruit development) 430
Lycopersicon (transgenic) 583
Lycopersicon (water deficit) 173
Lycopersicon (wound response) 91

Macroalgae 555
Mannose 546
Medicago 85
Medicarpin 596
Membrane intrinsic protein 85
Meristem 34
Meristem development 182
Metabolic signals 510
Metabolite profiling (quadrupole mass spectrometry) 841
Microgravity 396, 493
Microinjection 158
Minimal model (CAM rhythm) 761
Minor vein 105
Mitotic cyclins 632
Modulation 98
Monoclonal antibodies (JIM13, JIM16, LM2) 305
mRNA localization 227
Multifunctional protein 150
Multigene family 663
Multiplex polymerase chain reaction 606
Musa 546
Musa (banana, plantain) 791
Mutant *Arabidopsis* 34, 406, 855
Mutant (*Arabidopsis*, farnesylation) 182
Mutant *Arabidopsis* (*det2*) 781
Mutant (sunflower) 673
Mutants (nitrite-reductase-deficient) 440
Mycorrhiza 299
Myb 887

NADP-malic enzyme 265
Nannochloropsis 43
1-*N*-naphthylphthalamic acid 315
Nicotiana (transgenic) 864
Nicotiana (N metabolism) 510
Nicotiana (apoptosis) 614
Nicotiana (aquaporin) 167
Nicotiana (Calvin cycle) 112
Nicotiana (glutathione reductase) 537
Nicotiana (H^+-ATPase) 609
Nicotiana (IAA biosynthesis) 715
Nicotiana (N-metabolism) 519
Nicotiana (pollen germination) 752
Nicotiana (sulfur-deprivation) 587
Nitrate assimilation 587
Nitrate reductase 587
Nitrate reductase mutants 287
Nitrate signal 287
Nitrilase 855
Nitrite reductase 440
Nitrogen 701
Nitrogen metabolism 440, 510, 800
Nitrogen remobilization 519
Nodulation mutant 98
Non-linear dynamics (CAM model) 761
Nucleolytic enzymes 13

Olea europaea (O_2 flux) 384
Organelle 457
Organic acid 743
Organogenesis 563
Oryza sativa 227
Oryza (expansion) 467
Oryza (transgenic) 265
Oryza (cell cycle) 376
Oscillation (O_2 flux) 384
Oscillator 761
Osmotic stress 446
Oxalate oxidase 345
Oxidative burst 736
Oxidative stress (tolerance) 50
Oxygen flux 384, 474
Oxygen-selective microelectrode 384

Palmitic acid mutant 673
Paraquat resistance (oxidant induced) 50
Parenchyma (thick walled) 484
Patchiness (leaf photosynthesis) 761
Pathogenesis-related protein 791
Pectin 275, 423
Peg formation 493
Peptide growth factor 752
Periarbuscular membrane 609
Peroxidase 679
Peroxisome 150
Peroxisome targeting signal 150
pH regulation 246
Phaseolus (germination) 1
Phaseolus (membrane current) 894
Phenylcoumaran benzylic ether reductase 502
Phenylpropanoids 883
Phloem 743
Phloem loading 105
Phloem transport 833
Phosphate starvation response 13
Phosphate transport 390
Phosphoribulokinase 112
Photomorphogenesis 846
Photoperiod 182
Phototropin 807
Photosynthesis 112, 335, 384, 555, 864
Photosynthetic acclimation 807
Photosystem II activity 265
Photosystems II and I 770
Phototolerance 770
Phytic acid 823
Phytoene synthase 361, 846
Phytohormones 623
Phytophthora 596
Phytosiderophore 120
Phytosulfokine-α 752
Pisum 72, 423
Pisum (ethylene biosynthesis) 144
Pisum (GOR2 cDNA) 537
Plant defense 91
Plant nutrition 13
Plantain 546
Plant-insect interaction 62
Plasma membrane 446
Plasma membrane current (activation) 894
Plasmodesmata 105, 158
Plasmodesmata formation 370
Plastid differentiation 781
Polar transport (auxin) 315
Pollen germination 752
Pollen population effect 752
Polyamine biosynthesis 239
Polyhydroxyalkanoate 841
Polyhydroxybutyrate 841
Populus (lignification) 502
Precursor 72
Primordium 563
Processing 72
Productivity (photosynthetic) 335
Proembryogenic mass 200
Prolamellar body 846
Prosystemin 91
Protease 656
14-3-3 protein 446
Protein body 227
Protein import 449
Protein structure 791
Proteinase inhibitor 62
Proton flux 474
Protonema 133
Protoplast (patch-clamp) 894
Pyrrolizidine alkaloid 239

Quiescent center 23, 191

Raffinose 105
Replicon 127
Resurrection plant 693
Rhamnogalacturonan 275
Rhizoid 133
Ribulose-1, 5-bisphosphate carboxylase/oxygenase 555
RNA-fingerprinting 708

Root 191, 816, 874
Root (Al uptake) 355
Root (O_2 flux) 384
Root cap initials 23
Root culture 239
Root hair 722
Root meristem 127
Rosa (cell wall) 275
Rubus (fruit ripening) 708

S-adenosylmethionine decarboxylase 239
Salt stress 632
Secondary cell wall 256
Secondary plasmodesmata 370
Secretion (glycoprotein) 641
Seed (protein content) 833
Seed coat 484
Seed coat protoplasts 894
Seed formation 673
Seed germination 144
Seedling growth 1
Senecio 239
Senescence 519
Shoot apex 34
Shoot apical meristem 370
Signal transduction 596, 736
Signalling 144
Simulated microgravity 415
Sinapate 883
Sinapis (floral transition) 370
Sinapis (phytoene synthase) 846
Small stress proteins 575
Somatic embryogenesis 305, 457, 756
Spaceflight experiments 415
Spermidine synthase 239
Spirodela 823
Spodoptera 62
Starch 743
Statocyte 396
Statolith movement 396
Storage protein 325
Stress 756
Subcellular differentiation 474
Subtilisin-like gene 484
Sucrose efflux 77
Sucrose metabolism 729
Sucrose synthase 729
Sucrose synthesis 864
Sucrose transport 105
Sucrose:fructan 6-fructosyltransferase 701
Sucrose:sucrose 1-fructosyltransferase 701
Sugar 743
Sulfated peptide 752
Sulfur-deprivation 587
Suspension culture 656
Symbiosis 218
Symbiotic interface 299, 609
Symplastic communication 158
Systemin 91

Targeting signals 449
Temperature sensitivity 614
Thaumatin-like protein 791
Thylakoid 846
Tonoplast 390
Torenia (embryo sac) 158
Transcript abundance 701
Transcription detection 606
Transcription factor 887
Transgenic tobacco 112, 537
Transgenic tomato 583
Transposable element 887
Transit peptide 72
Translocation (Al) 355
Trigonelline 127
Triticum (Zn, Fe deficiency) 120
Tryptophan (IAA biosynthesis) 715
Tryptophan betaine 722
Tryptophan synthase 855
Turion 823

Uptake (Al) 355
UV radiation 555

Vacuole 77, 390
Vicia (germination) 1
Vicia (K^+ channels) 209
Vicia (seed development) 325
Vital stain 299
Vitis (disease resistance) 200

Wall model 275
Water deficit 173
Water transport 167, 874
Weightlessness 415
Wood 502
Wound response 62, 91

Xerophyta 693
Xylem 502
Xylem sap 355
Xyloglucan 275, 423

Yariv phenylglycosides 256

Zea 528, 874
Zea (ammonium assimilation) 800
Zea (cell wall) 679
Zea (DNA insertions) 887
Zea (root development) 23
Zea (wound response) 62
Zinc deficiency 120
Zinc efficiency 120